Before the
FEDERAL COMMUNICATIONS COMMISSION
Washington, D.C. 20554

In the Matter of	)	
	)	
Amendment of the Commission's Part 90 Rules in the 904-909.75 and 919.75-928 MHz Bands	)	WT Docket No. 06-49

COMMENTS OF TAMPA ELECTRIC COMPANY

Tampa Electric Company ("Tampa Electric") hereby comments on issues raised in the Notice of Proposed Rulemaking ("NOPR") in the above referenced proceeding.[1] In the NOPR, the Federal Communications Commission ("FCC" or "Commission") asked for comments regarding proposed changes to the Commission's existing rules governing the licensing and use of frequencies in the 904-909.75 MHz and 919.75-928 MHz portions of the 902-928 MHz band. The 902-928 MHz band is widely used by utilities to operate devices in several applications to enhance reliability, facilitate operations and achieve economies.

Tampa Electric is opposed to changes to the Part 90 multilateration Location and Monitoring Service ("M-LMS") rules. In particular, Tampa Electric believes that (i) preserving the "safe harbor" provisions for unlicensed Part 15 devices is essential for the enhancement of safe and reliable electric service; and (ii) expanding the permissible uses of the licensed part of the band would undermine requisite interference protection for unlicensed Part 15 devices and be costly and disruptive to the electric utility industry and their millions upon millions of customers.

TAMPA ELECTRIC COMPANY'S CURRENT USE

Tampa Electric is a public utility regulated by the Florida Public Service Commission ("FPSC") and serves a population of approximately 1.2 million within its 2,000 square mile territory. Tampa Electric's customers include businesses, residences and industrial plants as well as numerous

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[1] *In the Matter of Amendment of the Commission's Part 90 Rules in the 904-909.75 and 919.75-928 MHz Bands*, Notice of Proposed Rulemaking, WT Docket No. 06-49, FCC No. 06-24 (rel. March 7, 2006) ("NOPR").

governmental, public safety, health care and military locations. The FPSC mandates that utilities subject to its jurisdiction provide reliable service at economic cost. To achieve economy in the cost of monthly reading of its approximately 680,000 electric meters and in reliance upon the current FCC Part 90 multilateration Location and Monitoring Service ("M-LMS") rules, Tampa Electric began in September of 2003 to deploy automatic meter reading ("AMR") technologies and equipment to enhance the accuracy and reduce the cost of meter reading as compared with the use of its employees or contractors for visual monthly readings. As of the date of these comments, Tampa Electric is operating approximately 130,000 AMR devices on residential electric meters. The reading cost for these meters now averages five cents per meter per month versus approximately fifty cents for conventional visual reading and the $60,000.00 monthly savings achieved from the ability remotely to gather the data inures to the benefit of Tampa Electric's customers. The company plans to continue to deploy these facilities to as many of its approximately 680,000 electric meters as practical.

Tampa Electric uses these frequencies for more than just AMR. For example, its Supervisory Control and Data Acquisition ("SCADA") facilities operate on these frequencies to provide real-time status communications between substations and status information and remote operation of key transmission and distribution switches. SCADA often is used to control and enhance reliability of essential electric power systems in remote and rural locations. Reliable and economic rural service also promotes the communications and internet access that is a national and Commission goal.

Tampa Electric's Peoples Gas System ("PGS") division is a state-wide FPSC regulated natural gas utility that serves approximately 330,000 customers and PGS also uses AMR technology and devices. PGS' present AMR deployment has reached 40,000 meters and 98,000 more are slated for conversion in the near future. PGS' customers enjoy AMR economic benefits that are comparable to those enjoyed by Tampa Electric's customers and those benefits are similarly jeopardized by the prospect of rule change.

Changes to the Part 90 multilateration Location and Monitoring Service ("M-LMS") rules would create an undue risk of interference to Tampa Electric's system and threaten the efficiency and economies that thus far have been achieved for Tampa Electric's customers. Meter reading would cost ten times

AMR reading costs. The change out and stranded investment implications are substantial: Change out costs would range from $50 to 85 dollars per meter; Stranded investment losses, based on current levels of AMR deployment, are estimated at around $10 million dollars for Tampa Electric. Simple extrapolation of these numbers to the hundreds of utilities around the country that use some form of AMR or otherwise use the 902-928 MHz band (the NOPR acknowledges that "many millions of devices are now in use.) and their millions of customers demonstrates the potential effect upon our national economy of changes of the type being considered. For all of these reasons, Tampa Electric opposes any changes to the LMS rules at this time.

DISCUSSION

The NOPR asks whether the Commission should:

- expand the types of services that M-LMS licensees may offer beyond location based services,
- modify the rules to provide licensees with additional options in the use of the spectrum.[2]
- modify the technical rules for M-LMS licensees by changing the allowed power levels or allowing frequency hopping and other modulation techniques, and/or
- modify the Part 90 safe harbor rules that insulate unlicensed devices operating in the 902-928 MHz band.[3]

Rule changes that expand M-LMS service type or spectrum use increase the likelihood of harmful interference to important public utility facilities and must not be made. As Tampa Electric understands the current M-LMS rules, their purpose was and their function is to allow concurrent use of licensed and unlicensed devices while minimizing potential interference to unlicensed devices such as those used for AMR and SCADA . Tampa Electric and other public utilities have availed themselves of these existing Commission M-LMS rules and policies and invested substantial amounts in AMR systems and SCADA

[2] NOPR at ¶ ¶ 19-20.
[3] NOPR at ¶ ¶ 36-41.

and similar operational monitoring and control facilities that use these now-threatened frequencies. Tampa Electric has relied on these rules in adopting use of its AMR system.

With regard to power levels, unlicensed devices in the 902-928 MHz band such as the AMR systems that Tampa Electric and Peoples Gas use operate at levels that are considerably below those permitted for M-LMS devices. Additionally, the frequency hopping characteristics of unlicensed Part 15 devices are an important element of SCADA system security. Expanded use or numbers of M-LMS devices close to SCADA or AMR devices would impair SCADA and AMR function by subjecting them to potentially harmful interference. The Commission's restriction of M-LMS system uses when it adopted the M-LMS rules served to limiting the number of M-LMS devices that were likely to be deployed. That Commission action thus mitigated the possibility of such harmful interference from M-LMS sources and the rule does not need to be disturbed.

If anything, the Commission should consider mandating M-LMS power level reduction and spread spectrum technologies and similar measures to abate interference from M-LMS and thereby enhance the AMR systems' operating environment. Given present M-LMS power levels that exceed Part 15 levels, service rule changes that result in wider use and deployment of M-LMS devices would lead to more interference than presently permissible from those devices. This poses a real threat to the function and reliability of Tampa Electric's AMR and SCADA systems.

Finally, the present safe harbor rules provided at 47 C.F.R. 90.361 should be retained because these provisions are necessary and critical to protecting these widely used and important AMR unlicensed Part 15 devices from interference claims .

CONCLUSION

Simply put, the current rules are not broken and do not need to be fixed. Rule changes of the type suggested in the NOPR would create confusion, doubt and uncertainty. They would disrupt and add prohibitive costs to our nation's utilities with no concomitant benefit. The FCC should not act in a manner that jeopardizes the reliability and economy to which the millions upon millions of public utility customers across the country are justly entitled.

For the reasons set forth in these comments, Tampa Electric respectfully urges the Commission not to alter the Part 90 rules governing the licensing and use of frequencies in the 904-909.75 MHz and 919.75-928 MHz portions of the 902-928 MHz band but to retain them in their present form.

Respectfully submitted,

TAMPA ELECTRIC COMPANY

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